Epidemiology & Infection

VOLUME 117, 1996

SENIOR EDITOR
Professor B. Drasar

EDITORS
Dr D. Baxby
Dr K. A. V. Cartwright
Dr M. H. Hinton
Professor S. Palmer
Dr D. J. Platt
Dr D. L. Morse
Dr H. Watanabe
Dr P. J. Wilkinson

MANAGING EDITOR
Professor P. Morgan-Capner

EDITORIAL BOARD
R. M. Anderson
R. D. Barry
P. S. Brachman
M. Chernesky
J. C. de Jong
M. Degré
L. A. Devriese
R. G. Finch
E. A. C. Follett
R. J. Gilbert
D. J. Hampson
S. A. Howell
T. J. Humphrey
A. P. Kendal
J. B. Kurtz
D. H. Lloyd
S. Logan
T. J. Marrie
C. Martin-Bourgon
O. Meurman
E. Miller
P. P. Mortimer
R. Swanepoel
E. J. Threlfall
H. E. Tillett
J. P. Vandenbroucke
M. J. Woodward

CAMBRIDGE
UNIVERSITY PRESS

Published by the Press Syndicate of the University of Cambridge
The Edinburgh Building, Cambridge CB2 2RU, United Kingdom
40 West 20th Street, New York 10011-4211, USA
10 Stamford Road, Oakleigh, Melbourne 3166, Australia

© Cambridge University Press 1996

Printed in the United Kingdom by the Cambridge University Press, Cambridge

CONTENTS

No. 1 (AUGUST 1996)

Vero cytotoxin-producing *Escherichia coli*, particularly serogroup O157, associated with human infections in England and Wales: 1992-4
Thomas, A., Cheasty, T., Frost, J. A., Chart, H., Smith, H. R. and Rowe, B. 1

Enteroaggregative *Escherichia coli* associated with an outbreak of diarrhoea in a neonatal nursery ward
Čobeljić, M., Miljković-Selimović, B., Paunović-Todosijević, D., Veličković, Z., Lepšanović, Z., Zec, N., Savić, P., Ilić, R., Konstantinović, S., Jovanović, B. and Kostić, V. 11

Distribution, gene sequence and expression *in vivo* of the plasmid encoded fimbrial antigen of *Salmonella* serotype Enteritidis
Woodward, M. J., Allen-Vercoe, E. and Redstone, J. S. 17

Recurrent outbreaks of *Salmonella* Enteritidis infections in a Texas restaurant: phage type 4 arrives in the United States
Boyce, T. G., Koo, D., Swerdlow, D. L., Gomez, T. M., Serrano, B., Nickey, L. N., Hickman-Brenner, F. W., Malcolm, G. B. and Griffin, P. M. 29

***Salmonella virchow* PT 26 infection in England and Wales: a case control study investigating an increase in cases during 1994**
Willcocks, L. J., Morgan, D., Sufi, F., Ward, L. R. and Patrick, H. E. 35

Resurgence of cholera in Hong Kong
Lee, S. H., Lai, S. T., Lai, J. Y. and Leung, N. K. 43

Comparison of pulsed-field gel electrophoresis and ribotyping for subtyping of *Vibrio cholerae* O139 isolated in Thailand
Dalsgaard, A., Skov, M. N., Serichantalergs, O. and Echeverria, P. 51

Detection of pathogenic *Yersinia enterocolitica* using the multiplex polymerase chain reaction
Harnett, N., Lin, Y. P. and Krishnan, C. 59

World Health Organisation – supervised interlaboratory comparison of ELISAs for the serological detection of *Salmonella enterica* serotype Enteritidis in chickens
Barrow, P. A., Desmidt, M., Ducatelle, R., Guittet, M., Van der Heijden, H. M. J. F., Holt. P. S., Huis in't Velt, J. H. J., McDonough, P., Nagaraja, K. V., Porter, R. E., Proux, K., Sisak, F., Staak, C., Steinbach, G., Thorns, C. J., Wray, C. and van Zijderveld, F. 69

Isolates of *Salmonella enterica* Enteritidis PT4 with enhanced heat and acid tolerance are more virulent in mice and more invasive in chickens
Humphrey, T. J., Williams, A., McAlpine, K., Lever, M. S., Guard-Petter, J. and Cox, J. M. 79

Occurrence of *Listeria* species in prepacked retail sandwiches
Wilson, I. G. 89

Pneumococcal menigitis in the North East Thames Region UK: epidemiology and molecular analysis of isolates
Urwin, G., Yuan, M. F., Hall, L. M. C., Brown, K., Efstratiou, A. and Feldman, R. A. 95

Antibiotic prescribing during an outbreak of meningococcal disease
Stuart, J. M., Robinson, P. M., Cartwright, K. and Noah, N. D. 103

Respiratory syncytial virus infection and meningococcal disease
Stuart, J. M., Cartwright, K. and Andrews, N. J. 107

Iatrogenic outbreak of *M. chelonae* skin abscesses
Camargo, D., Saad, C., Ruiz, F., Ramirez, M. E., Lineros, M., Rodriguez, G., Navarro, E., Pulido, B. and Orozco, L. C. 113

Ante-natal screening for hepatitis B surface antigen: an appraisal of its value in a low prevalence area
Dwyer, M. J. and McIntyre, P. G. 121

Hepatitis B virus infection in general population in Madagascar: evidence for different epidemiological patterns in urban and in rural areas
Boiser, P., Rabarijaona, L., Piollet, M., Roux, J. F. and Zeller, H. G. 133

Microbiology of HIV associated bacteraemia and diarrhoea in adults from Nairobi, Kenya
Batchelor, B. I. F., Kimari, J. N. and Brindle, R. J. 139
Are homosexual males a risk group for hepatitis A infection in intermediate endemicity areas?
Ballesteros, J., Dal-Ré, R., González, A. and Del Romero, J. 145
Outbreak of vertigo in Wyoming: possible role of an enterovirus infection
Simonsen, L., Khan, A. S., Gary, H. E., Hanson, C., Pallansch, M. A., Music, S., Holmán R. C., Stewart, J. A., Erdman, D. D., Arden, N. H., Arenberg, I. K. and Schonberger, L. B. 149
Seroprevalence of astrovirus types 1 and 6 in London, determined using recombinant virus antigen
Kriston, S., Willcocks, M. M., Carter, M. J. and Cubitt, W. D. 159
An analysis of infection control of varicella-zoster virus infections in Addenbrooke's Hospital Cambridge over a 5-year period, 1987-92
Wreghitt, T. G., Whipp, J., Redpath, C. and Hollingworth, W. 165
Impact of incomplete coverage of neonatal dried blood spot screening on estimating HIV-1 seroprevalence
Hutchinson, E. J., Streetly, A., Grant, C., Pollitt, R., Eldridge, P. and Nicoll, A. 173
An epidemiological study of influenza viruses among Chinese farm families with household ducks and pigs
Shu, L. L., Zhou, N. N., Sharp, G. B., He, S. Q., Zhang, T. J., Zou, W. W. and Webster, R. G. 179
The incidence of *Cyclospora cayetanensis* in stool samples submitted to a district general hospital
Clarke, S. C. and McIntyre, M. 189
Past exposure and the dynamics of lymphatic filariasis infection in young children
Srividya, A., Das, P. K., Subramanian, S., Ramaiah, K. D., Grenfell, B. T., Michael, E. and Bundy, D. A. P. 195
Role of enteric pathogens in the aetiology of neonatal diarrhoea in lambs and goat kids in Spain
Muñoz, M., Álvarez, M., Lanza, I. and Cármenes, P. 205
Increased colonization potential of *Campylobacter jejuni* strain 81116 after passage through chickens and its implication on the rate of transmission within flocks
Cawthraw, S. A., Wassenaar, T. M., Ayling, R. and Newell, D. G. 213

Book Reviews 217

Epidemiological Studies: A Practical Guide
Democracy, Chaos and the New School Order
Manual of Clinical Problems in Infectious Diseases

No. 2 (October 1996)

A novel relationship between O-antigen variation, matrix formation, and invasiveness of *Salmonella enteritidis*
Guard-Petter, J., Keller, L. H., Mahbubur Rahman, M., Carlson, R. W. and Silvers, S. 219
The application of genotyping techniques to the epidemiological analysis of *Campylobacter jejuni*
Jackson, C. J., Fox, A. J., Wareing, D. R. A., Hutchinson, D. N. and Jones, D. M. 233
Epidemiological study on risk factors and risks reducing measures for campylobacter infections in Dutch broiler flocks
Van de Giessen, A. W., Bloemberg, B. P. M., Ritmeester, W. S. and Tilburg, J. J. H. C. 245
Prevalence and characteristics of *Escherichia coli* serotype O157:H7 and other verotoxin-producing *E. coli* in healthy cattle
Blanco, M., Blanco, J. E., Blanco, J., Gonzalez, E. A., Mora, A., Prado, C., Fernandez, L., Rio, M., Ramos, J. and Alonso, M. P. 251
Risk factors for *Neisseria meningitidis* carriage in a school during a community outbreak of meningococcal infection
Davies, A. L., O'Flanagan, D., Salmon, R. L. and Coleman, T. J. 259
Virulence of *Staphylococcus epidermidis* in a mouse model: significance of extracellular slime
Deighton, M. A., Borland, R. and Capstick, J. A. 267
Seroprevalence of brucella antibodies among persons in high-risk occupation in Lebanon
Araj, G. F. and Azzam, R. A. 281

Genomic diversity of *mec* regulator genes in methicillin-resistant *Staphylococcus aureus* and *Staphylococcus epidermidis*
Kobayashi, N., Taniguchi, K., Kojima, K., Urasawa, S., Uehara, N., Omizu, Y., Kishi, Y., Yagihashi, A., Kurokawa, I. and Watanabe, N. 289

Cryptosporidiosis in Wisconsin: A case-control study of post-outbreak transmission
Osewe, P., Addiss, D. G., Blair, K. A., Hightower, A., Kamb, M. L. and Davis, J. P. 297

The UK Register of HIV Seroconverters: methods and analytical issues
UK Register of HIV Seroconverters 305

Epidemiological patterns of hepatitis B virus (HBV) in highly endemic areas
Edmunds, W. J., Medley, G. F., Nokes, D. J., O'Callaghan, C. J., Whittle, H. C. and Hall, A. J. 313

The occurrence of hepatitis B and C viruses in Pakistani patients with chronic liver disease and hepatocellular carcinoma
Tong, C. Y. W., Khan, R., Beeching, N. J., Tariq, W. U. Z., Hart, C. A., Ahmad, N. and Malik, I. A. 327

An outbreak of hepatitis A associated with a bakery, New York, 1994: The 1968 'West Branch, Michigan' outbreak repeated
Weltman, A. C., Bennett, N. M., Ackman, D. A., Misage, J. H., Campana, J. J., Fine, L. S., Doniger, A. S., Balzano, G. J. and Birkhead, G. S. 333

Seroepidemiology of HTLV-I in relation to that of HIV-1 in the Gauteng region, South Africa, using dried blood spots on filter papers
Taylor, M. B., Parker, S. P., Crewe-Brown, H. H., McIntyre, J. and Cubitt, W. D. 343

Isotype-specific antibody responses to foot-and-mouth disease virus in sera and secretions to 'carrier' and 'non-carrier' cattle
Salt, J. S., Mulcahy, G. and Kitching, R. P. 349

Evidence of hantavirus in wild rodents in Northern Ireland
McCaughey, C., Montgomery, W. I., Twomey, N., Addley, M., O'Neill, H. J. and Coyle, P. V. 361

Antigenic and genetic analysis of equine influenza viruses from tropical Africa in 1991
Adeyefa, C. A. O., James, M. L. and McCauley, J. W. 367

Foal diarrhoea between 1991 and 1994 in the United Kingdom associated with *Clostridium perfringens*, rotavirus, *Strongyloides westeri* and *Cryptosporidium* spp.
Netherwood, T., Wood, J. L. N., Townsend, H. G. G., Mumford, J. A. and Chanter, N. 375

Restriction fragment length polymorphism of the pMJ101-like plasmid and ribo-typing in the fish pathogen *Vibrio ordalii*
Pedersen, K., Koblavi, S., Tiainen, T. and Grimont, P. A. D. 385

Genetic analysis of *Clavibacter toxicus*, the agent of annual ryegrass toxicity
Johnston, M. S., Sutherland, S. S., Constantine, C. C. and Hampson, D. J. 393

Human parvovirus B19 infection within a family and the risk for pregnant women
Azzi, A., Trotta, M., Zakrzewska, K., Balzer, E., Rogasi, P. G., Carocci, A. and Leoncini, F. 401

Book Reviews 405

Current Topics in Microbiology and Immunology. Measles Virus
Yersiniosis: Present and Future
Molecular Basis of Virus Evolution
Tuberculosis

Erratum 409

The transmission dynamics of hepatitis B in the UK, a mathematical model of evaluating costs and effectiveness of immunization programmes
Williams, J. R., Nokes, D. J., Medley, G. F. and Anderson, R. M.

No. 3 (DECEMBER 1996)

Incidence of invasive pneumococcal disease and distribution of capsular types of pneumococci in Denmark, 1989-94
Nielsen, S. V. and Henrichsen, J. 411

Epidemiological aspects of group B streptococci of bovine and human origin
Jensen, N. E. and Aarestrup, F. M. 417
An 18 year clinical review of septic arthritis from tropical Australia
Morgan, D. S., Fisher, D., Merianos, A. and Currie, B. J. 423
A foodborne outbreak of gastroenteritis involving *Listeria monocytogenes*
Salamina, G., Dalle Donne, E., Niccolini, A., Poda, G., Cesaroni, D., Bucci, M., Fini, R., Maldini, M., Schuchat, A., Swaminathan, B., Bibb, W., Rocourt, J., Binkin, N. and Salmaso, S. 429
***Listeria* species in domestic environments**
Beumer, R. R., te Giffel, M. C., Spoorenberg, E. and Rombouts, F. M. 437
Preventing epidemics in a community of households
Hall, R. and Becker, N. G. 443
A milk-borne campylobacter outbreak following an educational farm visit
Evans, M. R., Roberts, R. J., Ribeiro, C. D., Gardner, D. and Kembrey, D. 457
Experimental studies on the infectivity of non-culturable forms of *Campylobacter* spp. in chicks and mice
Van de Giessen, A. W., Heuvelman, C. J., Abbe, T. and Hazeleger, W. C. 463
Plasmid profiles, restriction fragment length polymorphisms and O-serotypes among *Vibrio anguillarum* isolates
Pedersen, K., Tiainen, T. and Larsen, J. L. 471
Problems in the diagnosis of foodborne infection in general practice
Palmer, S., Houston, H., Lervy, B., Ribeiro, D. and Thomas, P. 479
Tuberculosis outbreak in a Texas prison, 1994
Bergmire-Sweat, D., Barnett, B. J., Harris, S. L., Taylor, J. P., Mazurek, G. H. and Reddy, V. 485
The dynamics of scarlet fever epidemics in England and Wales in the 19th century
Duncan, C. J., Duncan, S. R. and Scott, S. 493
Distribution of *mip*-related sequences in 39 species (48 serogroups) of *Legionellaceae*
Riffard, S., Vandenesch, F., Reyrolle, M., and Etienne, J. 501
Viral meningitis due to echovirus types 6 and 9: epidemiological data from Western Australia
Ashwell, M. J. S., Smith, D. W., Phillips, P. A. and Rouse, I. L. 507
Association of *Chlamydia pneumoniae* IgA antibodies with recently symptomatic asthma
Hahn, D. L., Anttila, T. and Saikku, P. 513
A study of maternally derived measles antibody in infants born to naturally infected and vaccinated women
Brugha, R., Ramsay, M., Forsey, T. and Brown, D. 519
Nutritional status and delayed mortality following early exposure to measles
Aaby, P., Andersen, M. and Knudsen, K. 525
Genotyping of hepatitis C virus isolates from Basque Country, Spain
Cilla, G., García-Bengoechea, M., Perez-Trallero, E., Montalvo, I., Vicente, D. and Arenas, J. I. 533
The consequences of uncertainty for the prediction of the effects of schistosomiasis control programmes
Chan, M. S. 537
Severe giardiasis and cryptosporidiosis in Scotland, UK
Robertson, L. J. 551
Detection of four species of *Borrelia burgdorferi* sensu lato in *Ixodes ricinus* ticks collected from roe deer (*Capreolus capreolus*) in the Netherlands
Rijpkema, S. G. T., Herbes, R. G., Verbeerk-de Kruif, N. and Schellekens, J. F. P. 563

Book Reviews 567
Atlas of Infectious Diseases
Principles and Practice of Infectious Diseases: Antimicrobial Therapy

Indexes 569